APRIL/MAY 2025

23UCA21 — OBJECT ORIENTED PROGRAMMING CONCEPTS USING C++

Time : Three hours Maximum : 75 marks

Shanmuga Industries Arts & Science College T.V.Malai

SECTION A — (10 × 2 = 20 marks)

Answer ALL questions.

1. Give an example for Function Prototype.
2. Distinguish between Break and Continue statements.
3. What are Objects? How are they created?
4. Define Destructor.
5. State the benefits of using Inheritance.
6. Name the Operators that cannot be overloaded in C++.
7. Differentiate between Dynamic binding and Static binding.
8. Define the term Polymorphism.

9. What are called Stream Classes?

10. Write the use of seekg() and tellg() Functions.

SECTION B — (5 × 5 = 25 marks)

Answer ALL questions.

11. (a) Briefly describe the basic concepts of Object-Oriented Programming.

Or

(b) Describe about an Inline Function.

12. (a) Illustrate the usage of Scope Resolution Operator.

Or

(b) What is a Constructor Function? Write their characteristics.

13. (a) Exemplify the binary Operator Overloading.

Or

(b) Write short notes on Type Conversion.

14. (a) Narrate about the concept of Virtual Functions.

Or

(b) With an example, explain Pointers to Derived Classes.

15. (a) How do the cin>>c and cin.get(c) statements differ in operation'?

Or

(b) Summarize about the basics of Exception Handling.

SECTION C — (3 × 10 = 30 marks)

Answer any THREE questions.

16. Explicate the syntax of Nested if-else statements and write a C++ program to find the largest of three numbers using nested if-else statements.

17. Illustrate the usage of Classes and objects.

18. Expound the concept of Multiple Inheritance in C++.

19. Exemplify the One-dimensional Array in C++.

20. Describe the Sequential Read/Write Operations in C++.

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